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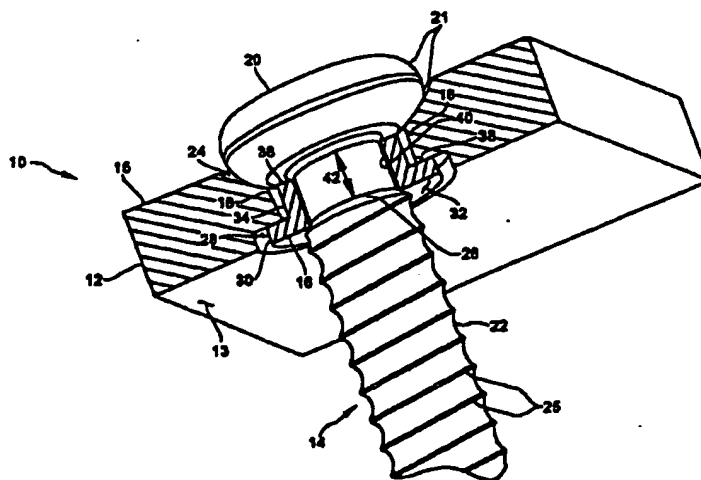
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(54) Title: APPARATUS FOR PREVENTING SCREW BACKOUT IN A BONE PLATE FIXATION SYSTEM



(57) Abstract

A system (10) for internal fixation of bone includes a fixation plate (12) having a number of bores (18) therethrough, a corresponding number of screws (14) each having an enlarged head portion (20) and an elongated shaft portion (22) defining bone engaging threads (25) and a non-threaded portion (42) between the head and threaded portions (20, 25), and a corresponding number of screw anti-back out members (16) each having a bore (45) therethrough. The screw anti-back out members (16) are positioned within the bores (18) of the fixation plate (12) and are initially sized to slidably receive an elongated shaft (22). The screws (14) are advanced through the plate bores (18) and screw anti-back out members (16) so that the fixation plate (12) is secured to the bone with the bores (45) of the screw anti-back out members (16) surrounding a non-threaded portion (42) of the shafts (22). The system (10) is thereafter heated sufficiently to shrink the bores (45), thereby trapping the non-threaded portions (42) of the screw shafts (22) between the fixation plate (12) and the threaded portions (25).

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